



# Draft PFAS Chemical Action Plan

## Public Comment Webinar

We're glad you could make it!

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# Draft PFAS Chemical Action Plan Public Comment Webinar

Thursday, November 12, 2020 - 2:00 p.m.  
**Wednesday, November 18, 2020 - 6:00 p.m.**  
Thursday, November 19, 2020 - 2:00 p.m.



# Today's webinar

- 1 How to participate today
- 2 Staff introductions
- 3 Why a Chemical Action Plan for PFAS?
- 4 CAP Recommendations
- 5 Public Comment  
This portion of the webinar is recorded
- 6 Contact Information

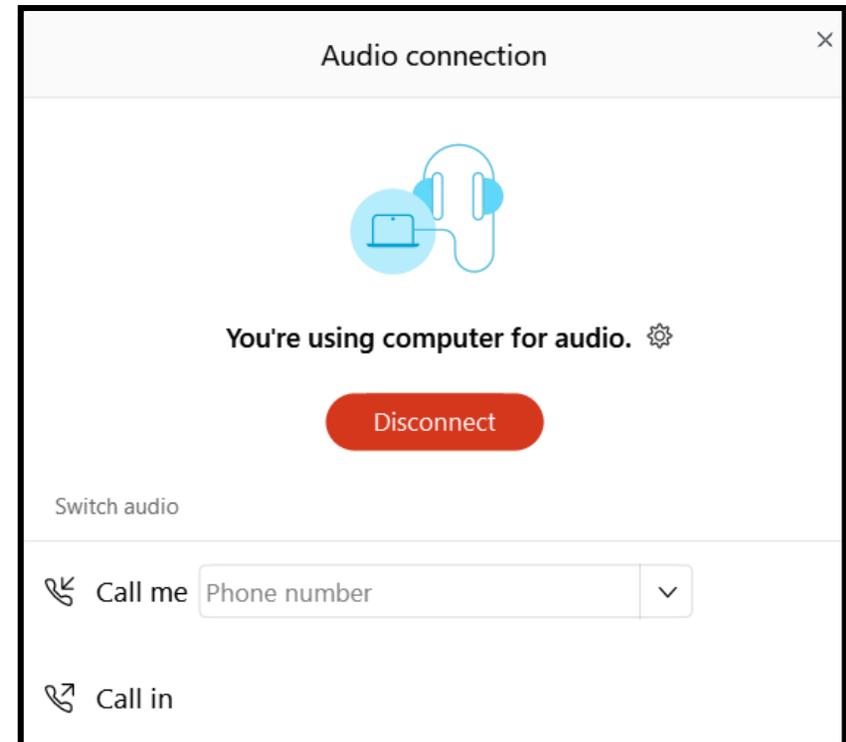
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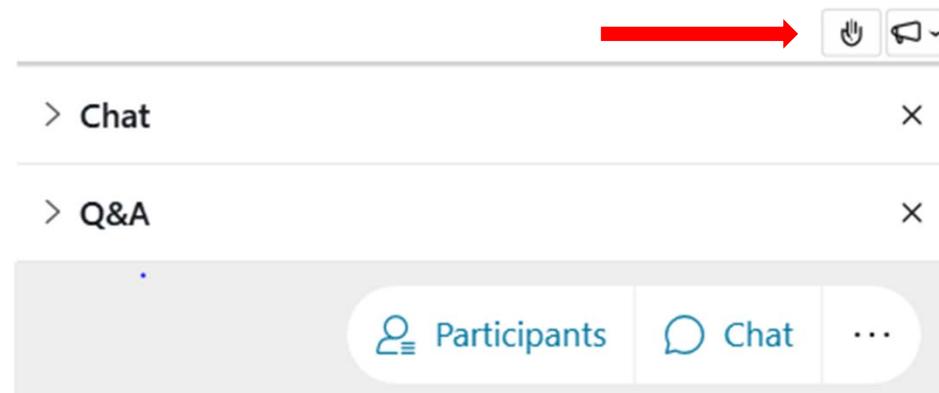


**Access presentation slides here:**

<https://www.ezview.wa.gov/?alias=1962&pageid=37105>

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- **Reminder: Public comments are recorded**

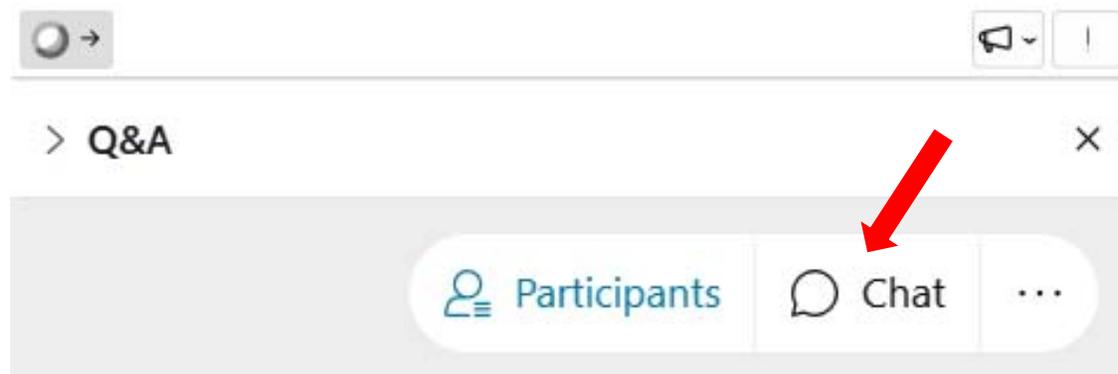


# How to Use WebEx

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Please note that we will not be accepting questions during this webinar.



# Introductions

## Agency Staff

### Ecology (HWTR)

- Irina Makarow, Chemical Action Planner
- Maria Blackshear & Megan Smith, webinar coordination
- Lauren Tamboer, Communications Consultant
- Kimberly Goetz, Legislative Liaison/Moderator

### Health

- Barbara Morrissey, Toxicologist



# Chemical Action Plan for Per- and Polyfluoralkyl Substances (PFAS)



# Why PFAS?

- Used in many everyday products
- Persist in the environment
- Nearly everyone is likely exposed to PFAS
- Harmful effects
- Replacement products not well understood
- Complex response





# Chemical Action Plans WAC 173-333-340

Why a Chemical Action Plan?

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## Persistent, Bioaccumulative Toxics (PBT) Rule

- WAC 173-333
- Perfluorooctane sulfonates (PFOS) and its related acids and salts: group of chemicals identified as PBT

## A Chemical Action Plan (CAP):

“...identifies, characterizes, and evaluates... uses and releases of Persistent Bioaccumulative Toxic chemicals... and recommends actions to protect... human health or the environment.”

- Ecology and Department of Health partner to prepare CAPs

# Advisory Committee

WAC 173-333-430

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- Represents stakeholders
- Provides input and expertise
- Consultative process
- Public Committee meetings

## Current members for PFAS CAP:

- Agency for Toxic Substances and Disease Registry
- American Chemistry Council
- Association of Washington Business
- City of Issaquah
- Clean Production Action
- Green Science Policy Institute
- Institute of Neurotoxicology & Neurological Disorders
- Island County Public Health
- King County Department of Natural Resources and Parks
- Washington State Patrol, Fire Training Academy
- Naval Facilities Engineering Command Northwest
- Outdoor Industry Association
- Port Gamble S'Klallam Tribe
- Port of Seattle Aviation
- Port of Seattle Fire Department
- Toxic-Free Future
- University of Washington
- Whidbey Island Water Systems Association
- Whitman College
- Zero Waste Washington

# CAP Process Timeline





# Public Comment

## WAC 173-333-430(6)

### Public Comment Requirements

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#### Methods of notice:

- WSR notice October 7, 2020.
- Ecology website
- Notice to interested persons via mailing lists
- Contacting interested organizations

#### Public Comment Period - Extended

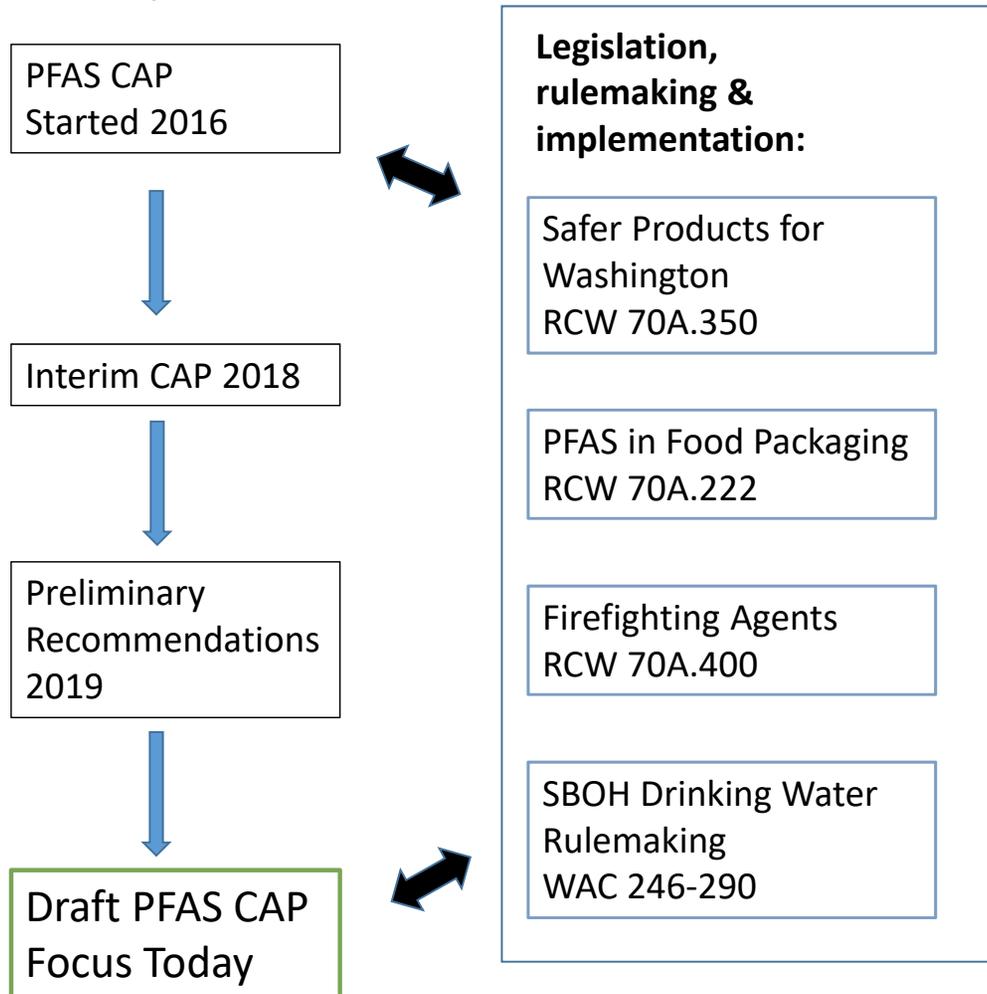
- Closes January 4, 2021
- E-comment, mail-in

#### Conduct public comment webinars:

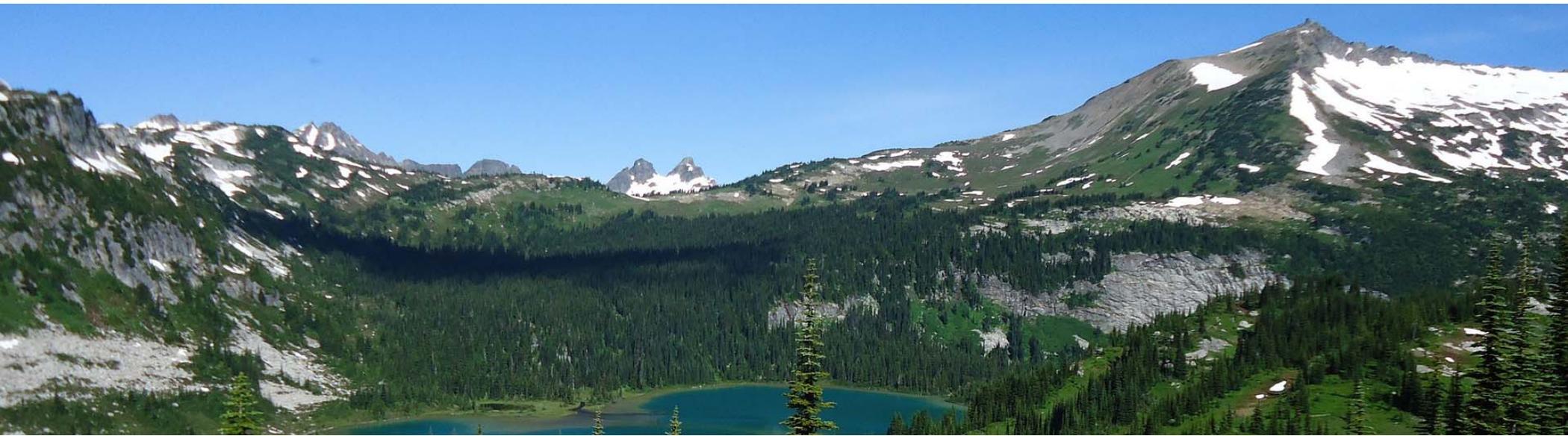
- November 12, 18 and 19, 2020
- Registration via PFAS CAP EZ view page

# Today's Focus

## Advisory:



- Development of the CAP => evolution of our knowledge
- Legislation, rulemaking, implementation
  - Safer Products for Washington
  - PFAS food packaging alternatives assessment
  - Firefighting Agents
  - Drinking water rulemaking (in progress)
- Today's focus: Draft PFAS CAP



# Draft PFAS CAP Overview



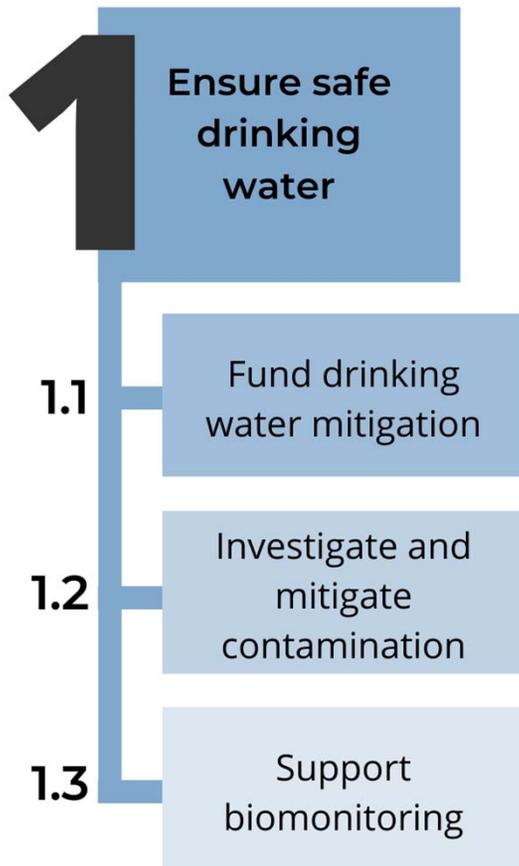
# Draft CAP for Public Comment

- Draft CAP
- App 1: Chemistry
- App 2: Analytical methods
- App 3: Sources and uses
- App 4: Fate and transport
- App 5: Ecotoxicology
- App 6: Occurrence
- App 7: Health
- App 8: Biosolids
- App 9: Regulations
- App 10: Economic analysis

# Draft PFAS CAP Recommendations



# 1. Ensure safe drinking water



## 1.1 Funding for drinking water mitigation

- Work across agencies to find mitigation funding
- Responsible parties identified, reimburse costs

## 1.2 Technical support, site investigation and mitigation

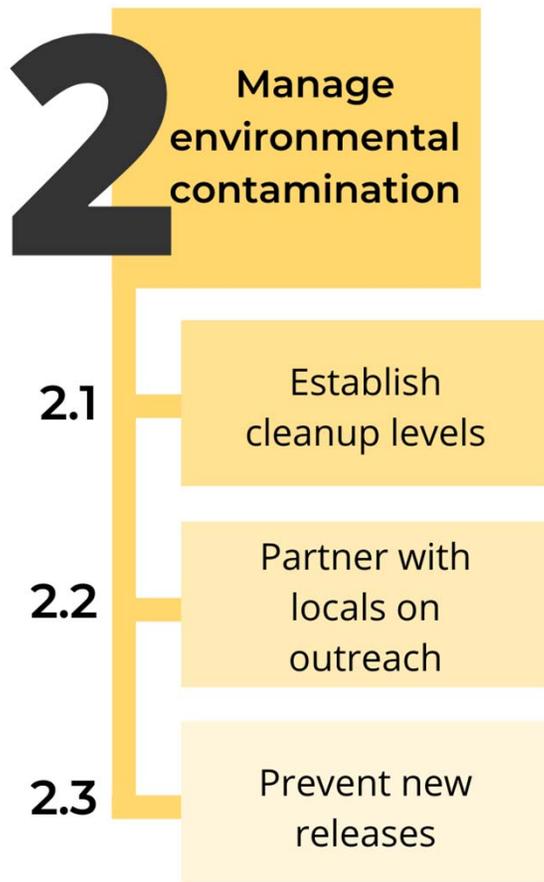
- Ecology collaborates to understand contamination
- DOH provides drinking water mitigation assistance
- Ecology targets Safe Drinking Water Action Grants
- Ecology investigates surface and groundwater
- “Fingerprinting” chemical identities

## 1.3 Support biomonitoring

- Support subsidized biomonitoring
- Participation in epidemiological studies



# 2. Manage environmental contamination



## 2.1 Establish clean-up levels for soil and groundwater

- Develop PFOS/PFOA cleanup levels based on Health's drinking water standards
- Explore methods for investigation and clean-up
- Provide information to interested parties

## 2.2 Partner with Local Organizations

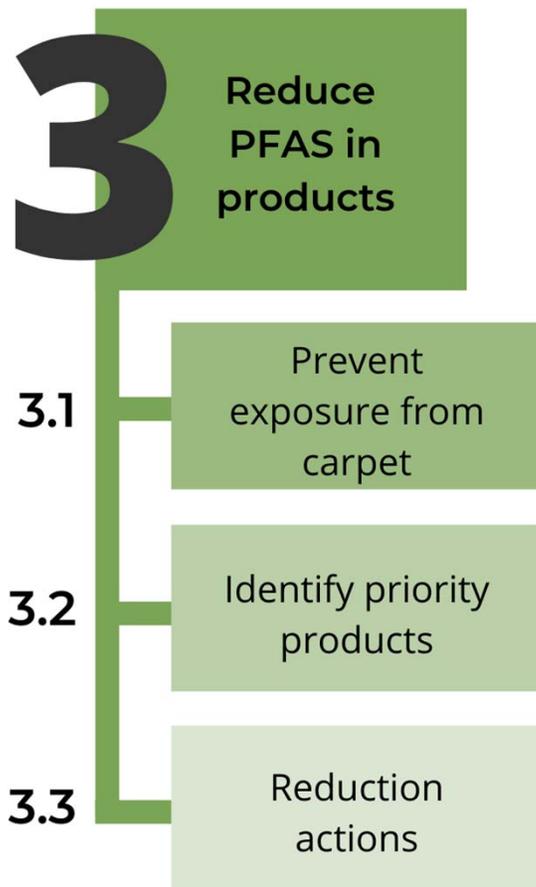
- Identify and distribute funding to local health departments and local organizations

## 2.3 Prevent AFFF and manufacturing process releases

- Work proactively to eliminate releases
- AFFF: develop best management practices for containment, disposal/replacement
- Industry: identify use, opportunities for replacement, proper waste management



# 3. Reduce PFAS in products



## 3.1 Carpet, upholstery, after-market treatments

- Continue work under Safer Products for Washington
- Purchasing policy for PFAS free products, swap-out

## 3.2 Consider other sources in 2<sup>nd</sup> Safer Products cycle

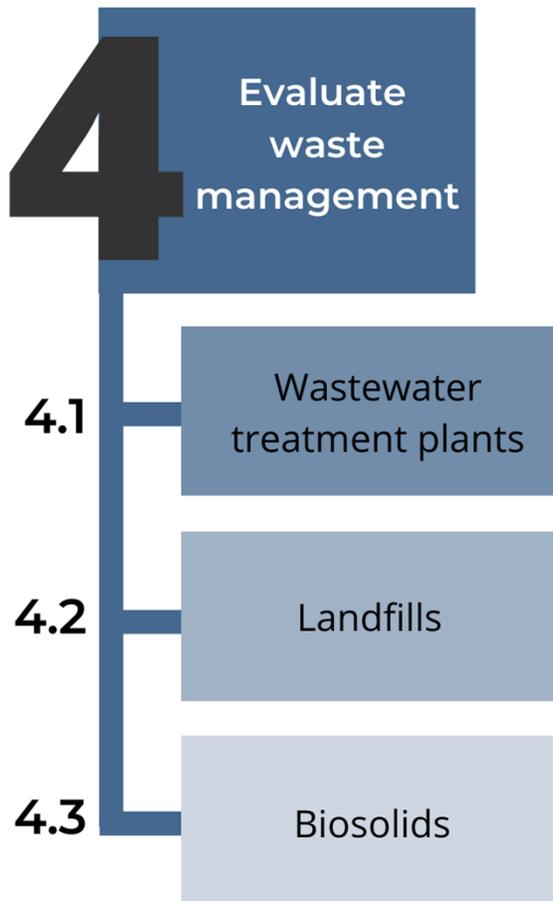
- Engage with overburdened communities
- Assess availability/feasibility of safer alternatives

## 3.3 Implement other reduction actions

- Propose restrictions under Chapter 70.365 RCW
- Gather information/reduce exposures for overburdened communities
- State purchasing preference for PFAS-free textiles, furniture, paints
- Propose ban on import/sale of phased-out long-chain PFAS



# 4. Evaluate waste management



## 4.1 PFAS in waste water treatment

- Study discharges to WWTPs
- Consider additional industrial monitoring requirements

## 4.2 Sample landfill leachate

- Study to sample landfills and identify contributing waste streams
- Consider monitoring for PFAS in leachate

## 4.3 Evaluate biosolids management

- Accredited laboratories/use EPA validated analysis methods
- Investigate land application sites, get biosolids data
- Evaluate realistic exposure pathway and risk models





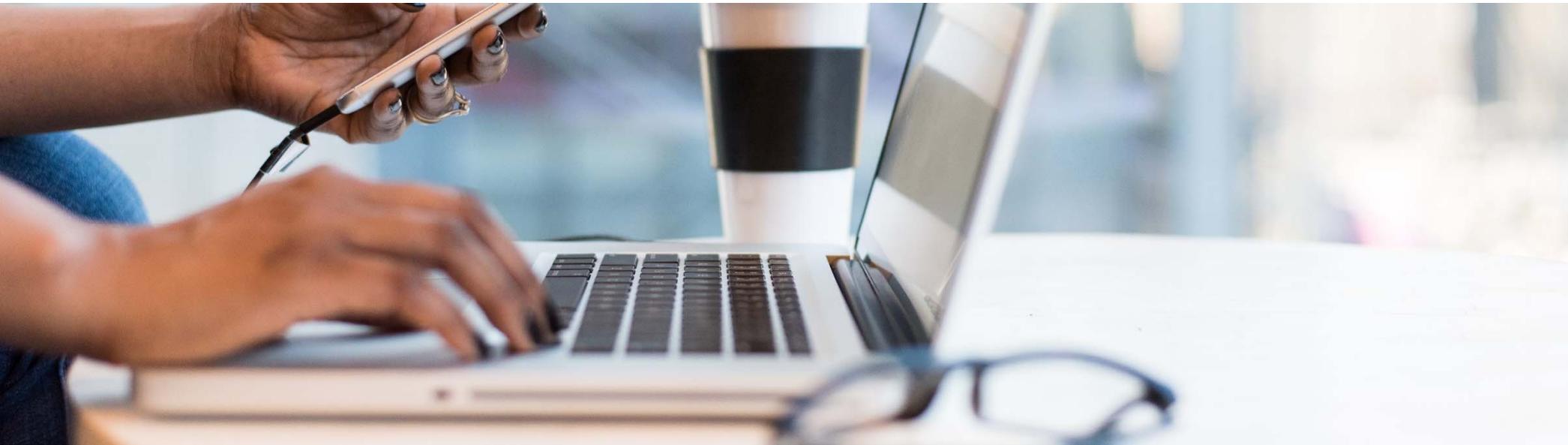
## Do you have questions about the CAP?

Contact Irina Makarow....

By phone: 360-407-6250

By e-mail: [irina.makarow@ecy.wa.gov](mailto:irina.makarow@ecy.wa.gov)





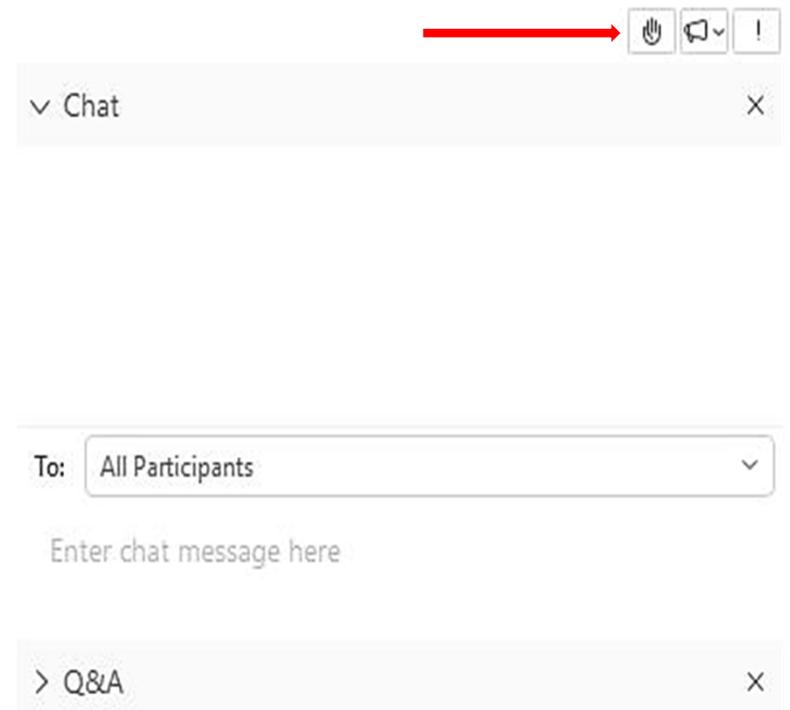
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# Public Comment Methods

## Comment webinars

- Thursday November 12, 2020 - 2 PM
- Wednesday November 18, 2020 - 6 PM
- **Thursday November 19, 2020 - 2 PM**

## In writing - EXTENDED

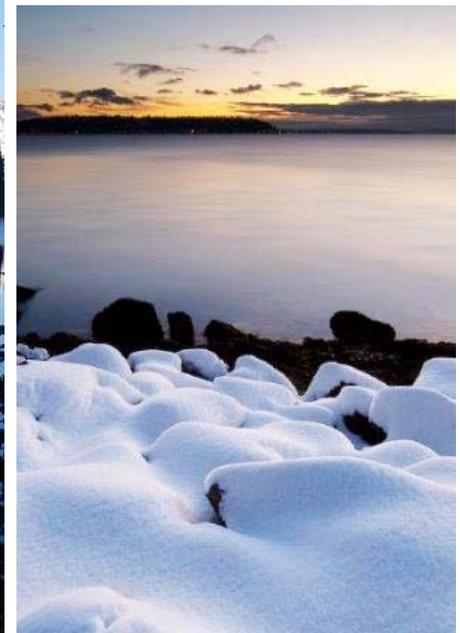
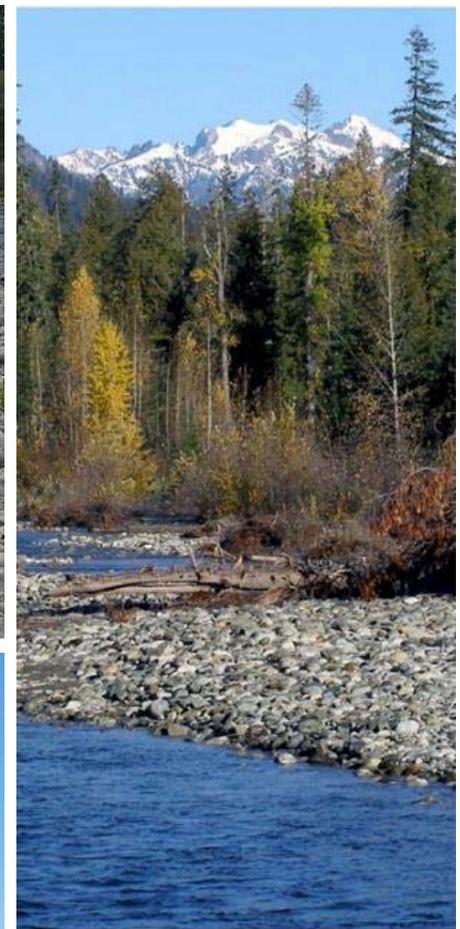
- E-Comment – by January 4, 2021
- E-mail – by January 4, 2021
- By Mail – postmarked no later than January 4, 2021

## More information:

<https://www.ezview.wa.gov/?alias=1962&pageid=37105>

## Or contact Irina Makarow:

- 360-407-6250
- [irina.makarow@ecy.wa.gov](mailto:irina.makarow@ecy.wa.gov)





# Conclusion



# Next Steps

Issuing the  
Final CAP

October –  
December  
2020

## Receive Comments

- Conduct comment webinars
- Receive comments

January – March  
2021

## Prepare Final CAP

- Review comments
- Additional analysis if necessary
- Prepare response to comments
- Engage with Advisory Committee
- Prepare Final CAP

Spring 2021

## Issue Final CAP

# PFAS CAP Contacts

## Irina Makarow, CAP lead

- 360-407-6250
- [irina.makarow@ecy.wa.gov](mailto:irina.makarow@ecy.wa.gov)

## PFAS CAP website

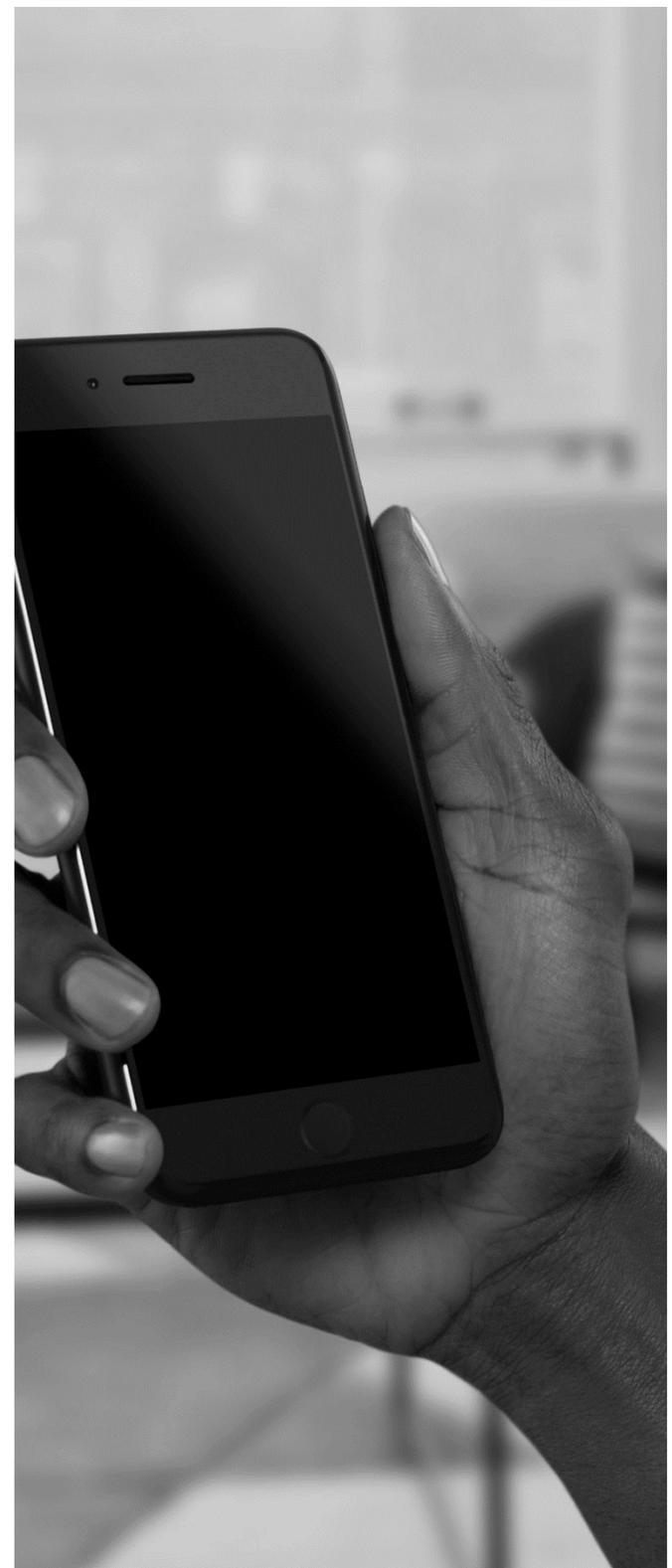
<https://www.ezview.wa.gov/?alias=1962&pageid=37105>

## PFAS CAP email list

<http://listserv.ecology.wa.gov/scripts/wa-ECOLOGY.exe?AO=CHEMICAL-ACTION-PLAN>

## Agency Web Pages

- Ecology: <https://ecology.wa.gov/PFAS>
- DOH:  
<https://www.doh.wa.gov/CommunityandEnvironment/Contaminants/PFAS>



**Thank you for your time!**